

American International University-Bangladesh (AIUB)

Department of Computer Science

Faculty of Science & Technology (FST)

Summer 21 22

Section: A/ B/ E

Software Quality Assurance and Testing

ECOMMERCE SHOPPING SYSTEM

A Report submitted

By

SN	Student Name	Student ID
1	Rifat, MD. Ashraf Hossain	18-38928-3
2	Chowdhury, Ananya	18-39028-3
3	Zahir, Tanzima	18-38958-3
4	Pritha, Israt Jahan	18-39023-3

Under the supervision of

ABHIJIT BHOWMIK

Associate Professor, Computer Science

American International University - Bangladesh

Software Test Plan

for

<Project>

Version 1.0 approved

Prepared by <author>

<organization>

<date created>

Checked By Industry Personnel

Name:

Designation:

Company:

Sign:

Date:

Table of Contents

Revision History	5
1. TEST PLAN IDENTIFIER: OS-Ecommerce01.7	5
2. REFERENCES.....	5
3. INTRODUCTION.....	5
3.1 Background of the problem.....	5
3.2 Solution to the Problem	6
4. REQUEIREMNT SPECIFICATION	7
4.1 System Feature.....	7
Customer Features.....	7
Vendor Features.....	7
Admin Features	7
4.2 System Quality Attributes.....	8
4.2.1 Usability :.....	8
4.2.2 Efficiency :	8
4.2.3 Usability :.....	8
4.2.4 Maintainability:.....	8
4.2.5 Testability:.....	8
4.2.6 Security:	9
4.2.7 Flexibility:	9
4.2.8 Portability:.....	9
4.2.9 Reusability:.....	9
4.3 System Interface:	10
4.4 Project Requirements:	13
5. FEATURE NOT TO BE TESTED:	14
5.1 Features to be tested.....	14
5.2 FEATURE NOT TO BE TESTED:	15
6. TESTING APPROACH	15
6.1 Testing Levels.....	15
Unit Testing	15
Integration / System Testing.....	16
Performance and Stress Testing	16
Regresstion testing.....	17
Acceptance Testing	17
6.2 Test Tools.....	18
Testing Process:.....	18
Result:	20
6.3 Meetings.....	23

7. TEST CASE/TEST ITEMS	24
7.1 Test case 01:.....	24
7.2 Test case 02:.....	25
7.3 Test case 03:.....	26
7.4 Test case 04:.....	27
7.5 Test case 05:.....	28
7.6 Test case 06:.....	29
7.7 Test case 07:.....	30
7.8 Test case 08:.....	31
7.9 Test case 09:.....	32
8. ITEM PASS/FAIL CRITERIA	33
9. TEST DELIVERABLES.....	33
10. STAFFING AND TRAINING NEEDS.....	33
11.RESPONSIBILITIES	35
12.TESTING SCHEDULE.....	35
Incident Testing Report:	37
13.PLANNING RISKS AND CONTIGENCIES	38
14. APROVALS.....	38

Revision History

Revision	Date	Updated by	Update Comments
0.1	08-08-2022	Chowdhury, Ananya	First Draft
0.2	11-08-2022	Zahir, Tanzima	Second Draft
0.3	13-08-2022	Rifat, MD. Ashraf Hossain	Third Draft
0.4	16-08-2022	Pritha, Israt Jahan	Fourth Draft

1. TEST PLAN IDENTIFIER: OS-Ecommerce01.7

2. REFERENCES

- a. Software Requirement Specification (SRS) Document
- b. Software Requirement Specification(SRS) for Online Shopping System(OSS) https://dipeshagrawal.files.wordpress.com/2018/07/docuri-com_online-project.pdf
- c. Online Grocery Shop in PHP or ASP.NET – <https://t4tutorials.com/online-grocery-shop-in-php-or-asp-net-srs-document/>

3. INTRODUCTION

3.1 Background of the problem

Our e-commerce shopping system “is designed in the subject of the background description. Online-based shopping system has enormous potential to ensure quality, accessibility, and affordability in developing countries. This effort assists everyone in getting goods at a cheap rate with minimum effort. We went with a web-based solution since it is simple to use, and it will compatible with hand-held and non-handheld devices. The project's shared stance is that everyone is engaged and benefiting from the online site. Our “e-commerce shopping system “ is designed to address the weakness of the existing traditional shopping system and change it to make online-based shopping for reaching a wide number of the user through the user of the phone, This software is required to remove or, in some cases, minimize the difficulties that typical system now faces

, unlike traditional brick-and-mortar businesses where someone has to be present in the store at all times, online businesses allow you to run your company from anywhere, anytime. Thus, online businesses give you that work-life balance. Essential to think about Covid-19 has caused so much harm to people's health in the last two or three years. so now

people want to maintain distances in all forms of life's, to deliver goods and need to their footstep will reduce the risk of affections of covid. Our website may give guidelines to make a non-software/internet user use the software easy, will have full documentation to use the software to do basic tasks with very minimal effort

3.2 Solution to the Problem

Manual management and organizational methods such as the traditional pen and paper approach are still utilized in a large number of business settings around the world. This program is simple to use and allows medium and small businesses to provide excellent service and save a lot of time in managing and selling things in the quantity that was once unthinkable. For global customers, can make payments conveniently in their currencies because online payment services will automatically convert their currency to the currency that you will receive an online business can offer you cheaper, easier and faster business environment. Online business is suitable for those who are seeking to start a new business but have a tight budget. Start-up and overhead costs are relatively low and you can start implementing zero-marketing strategies through online advertising and social media from day one. Furthermore, the transaction process between your business and customer can be done in a matter of seconds and you have the flexibility of doing your business in terms of time and location. This will have additional Accounting software as is less prone to making mistakes and you can also find an audit trail when you use it. In an excel sheet, you can't keep track of anybody making changes to your data so the possibility of fraud increases. Moreover, accounting software is also easier to manage, you don't have to go through the hassle of having multiple spreadsheets. That is why using Accounting software is more efficient, organized, and saves you a lot of time. Now you will have enough time to focus on other matters in your business that need attention. There will be an integrated workforce management system or the IWMS for short is one of the holy grails of online businesses. It is harder to understand data and information when they come in from everywhere while you juggle between software.

the point of using the software in your business is to make your experience of handling business more organized, easier, and efficient. When you choose to deal with matters manually, you will start to notice errors surfacing and things slipping past your eye as the workload increases. Technology and software make these menial tasks a lot easier and save you the money you would have had to spend on manpower to handle these tasks. It also decreases the margin of human error in your data so that you can have accurate information at your disposal.

4. REQUIREMENT SPECIFICATION

4.1 System Feature

■ Customer Features

- Can register on the website
- Can give feedback on the products they purchase
- Can update their profile
- Can request unavailable products
- Can contact the admin from the contact us form
- Can purchase products
- Can transaction through mobile banking/COD
- Can trace the delivery status
- Can request another country's products through our app

■ Vendor Features

- Can log into their account
 - Can add products for their shop
 - Can See the updates on the product
 - Can Update their Profile
 - Can See the Product Reviews
 - Can See their total Shop Management
- Priority Level: High
Precondition: vendors have valid user id and password

■ Admin Features

- Can log into their account.
 - Can update their profile.
 - Can add another admin.
 - Can see everyone's information.
 - Can edit everyone's information.
 - Can delete anyone from the website.
 - Can delete any feedback.
- Priority Level: High
Precondition: admin has valid user id and password

4.2 System Quality Attributes

4.2.1 Usability :The program should be simple to use. It should be simple to grasp. The navigation should be straightforward. The system should be able to: It is simple to use for input preparation, operation, and output interpretation. To ensure that our other widely used systems have consistent user interface standards or practices. The system is simple to learn for new or regular users. A trained user shall be able to submit a complete request for creating an event, deleting, or confirming a member in an average of two minutes and a maximum of five minutes.

Priority Level: High

4.2.2 Efficiency :The most important aspect of system quality. assessed in terms of the time it takes for the system to execute any job assigned to it. The application will be efficient on a broad scale. At least 30 percent of the processor capacity and RAM available to the application shall be unused at the planned peak load conditions. So that, the user can get instant responses to use the software if the number of users is high.

Priority Level: Medium

4.2.3 Usability :The most important aspect of system quality. assessed in terms of the time it takes for the system to execute any job assigned to it. The application will be efficient on a broad scale. At least 30 percent of the processor capacity and RAM available to the application shall be unused at the planned peak load conditions. So that, the user can get instant responses to use the software if the number of users is high.

4.2.4 Maintainability: If a user receives incorrect information, they can readily change it. However, the user must pass a security check before making changes. Different software versions should be simple to manage. It will be simple to add code to the existing system for development, and it should be simple to update for production. From time to time, new features and technologies are added. Maintenance must be both inexpensive and simple. It should be simple to maintain the system and fix bugs or make software modifications.

Priority Level: Medium

4.2.5 Testability: The maximum cyclomatic complexity of each module shall not exceed 20, which will help in testing when adding other modules as well as help in maintainability. It should be simple to test and detect flaws in the system. It should be simple to break into distinct modules for testing if necessary.

Priority Level: High

4.2.6 Security: Unauthorized person cannot manipulate or access data from the software without proper authentication. New devices will ask for authentication or verification of user identity.

Priority Level: High

4.2.7 Flexibility: For modifying the operational program a programmer who has at least 6 months of experience working on the program can easily make a new copy output or add modifications without any issue at all.

Priority Level: Medium

4.2.8 Portability: This E-Commerce site can be utilized on a variety of mobile platforms (e.g., Android, iOS, Windows). It Should be low-cost and easy to migrate in terms of technological concerns.

Priority Level: High

4.2.9 Reusability: Reusing software is an excellent, cost-effective, and time-saving development technique. Different code library classes should be generic enough to be utilized in a variety of application modules without difficulty. breaking the program into modules so that components may be reused throughout the app

Priority Level: High

4.3 System Interface:

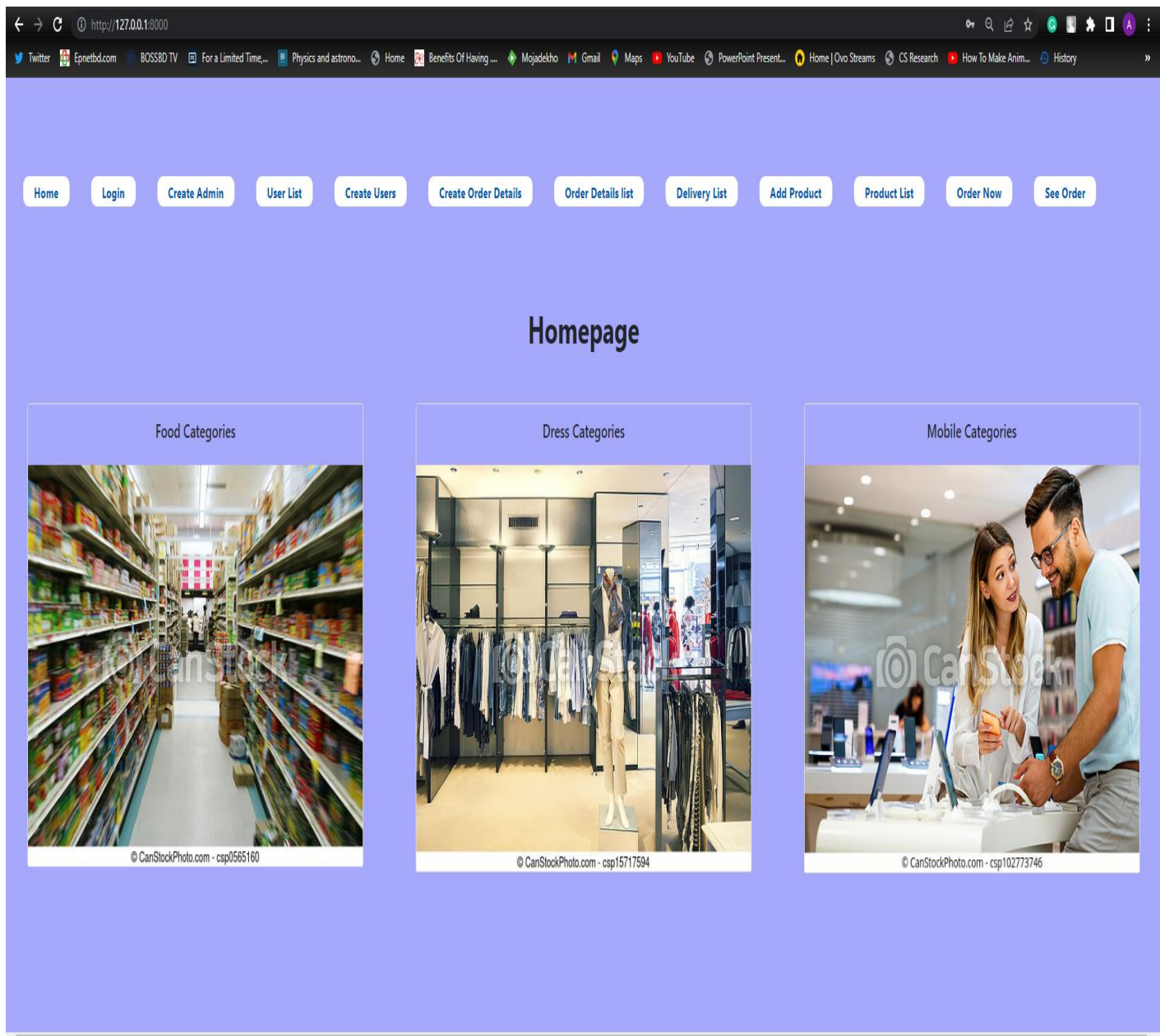


Figure 1: Home Page

Here, We are showing the homepage of our system where the Categories are Food Categories, Dress Categories, Mobile Categories and the can go through those and can choose products from that.

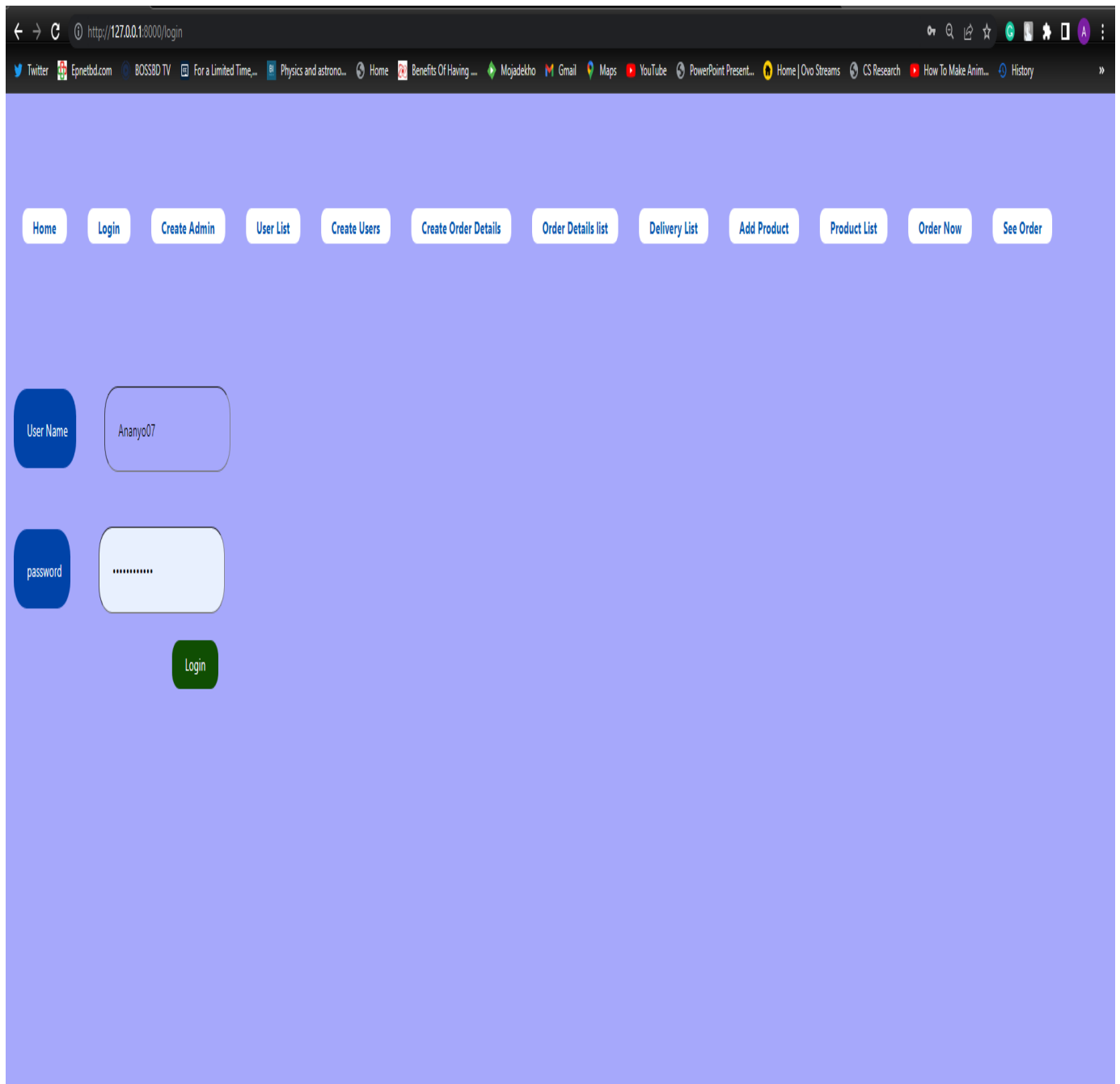


Figure 2: Login Page

Here, the username and password will be given and it will automatically by the python selenium tester. Also After that it will go to the profile of the user and they can access some links that was restricted. And also they can look for the list of the users.

http://127.0.0.1:8000/user/create

Twitter Egnetsbd.com BOSS80 TV For a Limited Time... Physics and astrono... Home Benefits Of Having ... Mojadekho Gmail Maps YouTube PowerPoint Present... Home | Ovo Streams CS Research How To Make Anim... History

Home Login Create Admin User List Create Users Create Order Details Order Details list Delivery List Add Product Product List Order Now See Order

Name

Phone

Address

Username

Shuvo

Email

Password

Profile Picture

default.jpg

Sign Up

Figure 3: User Registration

Here, user can register their account and after creating that they will go to the login section. If they don't complete any input field their will be validation that they didn't filled those section. After filling those they will click the sign up button and it will create a new account for them.

4.4 Project Requirements:

- Here, we will estimate and describe project constraints including time, budget, and resources for our E-Commerce Site software using COCOMO (Constructive Cost Model). Our project type for the COCOMO model will be Semi-Detached C due to the unfamiliar environment and the requirement for a medium size team. Line of Code (LOC) is about 54,780 which is suitable for Semi-Detached COCOMO model.

Based on SLOC characteristics, and operates according to the following equation,

$$\text{Effort, PM} = \text{Coefficient} \times \text{Effort Factor} \times \left(\frac{\text{SLOC}}{1000} \right)^P$$

$$= 3.0 \times \left(\frac{54.780}{1000} \right)^{1.12}$$

$$= 265.70 \text{ Person Month}$$

$$\text{Development Time, DM} = 2.50 \times (\text{PM})^T$$

$$= 2.50 \times (265.70)^{0.35}$$

$$= 17.63 \text{ Months}$$

Required Number of people, ST = Effort (PM) / Development Time (DM)

$$= 265.70 / 17.63$$

$$= 15.07 \cong 15 \text{ Person}$$

- For cost estimation we will take development time in days and number of hours the project team works, which we will consider to be 8 hours/day

$$\text{Total hours required} = 8 \times 516$$

$$= 4128 \text{ hours}$$

$$\text{Total build cost} = 4128 \times 950$$

$$= 39,216,00 \text{ BDT}$$

- These numbers do not reflect actual pricing of our software development. We will also be spending on licenses for the software and other equipment as well. So, the estimated cost will be approximately 45lac-50lac.

5. FEATURE NOT TO BE TESTED:

5.1 Features to be tested

Describing the items/features/functions to be tested that are within the scope of this test plan.,also Including a description of how they will be tested, when, by whom, and to what quality standards. Also, include a description of those items agreed not to be tested.

Item To Test	Test Description	Test Date	Responsibilities
Registration	this is a registration feature that is crucial to be tested otherwise new member will not be allowed to login and use the system as it was meant or intended for	18/8/2022-22/08/2022	Chowdhury, Ananya
Login	this is the feature that will help user to enter into the system by providing username and password	22/08/2022-25/08/2022	Zahir, Tanzima
Forgot Password	This feature will ask for the valid email number and send a verification code to the user's email and approve that verification code and will provide a new password	25/08/2022-26/08/2022	Rifat, MD. Ashraf Hossain
Show All product in user's homepage	As user will buy goods from their home page all the products must show in their home page	28/08/2022-5/09/2022	Pritha, Israt Jahan
Product add to the cart	As user can see product they must be	5/09/2022-10/09/2022	Chowdhury, Ananya

	able to purchase product right of the bat		
Number of product choose	As price will increase or decrease in the ratio of add or deleting product this feature must be tested appropriately	10/09/2022-11/09/2022	Zahir, Tanzima
Payment procedure	User must be able to pay within ebanking or mobile banking system where user will receive 2% discount , user can also select cash on delivery	12/09/2022-18/09/2022	Rifat, MD. Ashraf Hossain

5.2 FEATURE NOT TO BE TESTED:

The following is a list of the areas that will not be specifically addressed or not be tested in the mean time that will make the testing more clunky and feasible . All testing in these areas will be indirect as a result of other testing efforts. For example:

Multiple Language System: In this web application there are two types of language option. One is Bangla and another is English. But most users prefer to use English language. There are very few people who will select the Bangla language.

Dark Mode Option: In our web application there two modes. One is the normal mode and the other is dark mode. The default mode is the normal mode. User can change the mode by their preferences. But it is not as necessary option to test.

Theme Change Option: Admin can change theme of the website as well as can change the font size. It is not so important to test because it will not create any impact on our website as all the themes and the fonts are already made comfortable enough for the users.

Store Score: As first iteration of the software store score in this system will not be tested , it can tested in the later update but not at this moment

6. TESTING APPROACH

6.1 Testing Levels

■ Unit Testing

- Developer conducts the code review process first, followed by the development team leader. Changes will be performed if needed by the developer after review.
- Domain testing is done to ensure specific input data executes in the specific path.
- Functional program testing is done to make sure the desired results are produced.
- Different debugging technique is performed to find or identify the error.
- Developers complete this stage, which is then approved by the development team leader.

Participants: Chowdhury, Ananya developer who would be responsible for Unit Testing.

Methodology: taking each functionalities and test it individually in unit testing . developer will write the testing script, sequence will be top to bottom of events for Unit Testing and testing activity will done by individual developer

■ Integration / System Testing

- After all critical defects have been identified while unit testing and corrected then Integration testing is performed by integrating modules.
- We choose a bottom-up approach for the integration testing. Low-level modules are integrated first and then moved up to the top-level module.
- Integration testing is completed After 100% design verification and the hardware/software test plan is reviewed and executed.
- With the help of individual developers test manager and development, team leader conducted integration testing as a series of test cycles.

Participants: dedicated testing team will do integration testing . there will be a testing team leader who will monitor all the work and will List the individuals who will be responsible for this activity. testing team leader **Zahir, Tanzima**

Methodology: after unit testing is done for individual functionalities all the module will be integrated together and testing for the system works properly . **Zahir, Tanzima** will write Unit Testing script , and the sequence of events of System & Integration Testing, and how will the testing activity take place

■ Performance and Stress Testing

- Performance testing is carried out to check the system's performance under varying loads.
- It contains load and stress testing as components.

- It checks scalability, speed, reliability etc. of the system or software application.
- In performance testing, limit of load is both below and above the threshold of break.
- It ensures that the system or software application performs properly.
- Performance testing is performed by uniformly varying the load.
- Load vary from lowest to highest limit in a uniform manner.
- Stress testing is carried out to check the behavior of the system under the sudden increased load.
- Stress testing is the subset of the performance testing.
- It only checks the stability of the system or software application.
- In stress testing, limit of load is above the threshold of break.
- It ensures the security of the system under the failures.
- Stress testing is performed by increasing the load suddenly. Load is directly changed from lowest to highest(extreme) point.

Participants: Rifat, MD. Ashraf Hossain will be conducting Stress Testing for this project his team will be responsible for this activity.

Methodology: Performance testing is carried out to check the system's performance under varying loads Stress testing is carried out to check the behavior of the system under the sudden increased load. **Rifat, MD. Ashraf Hossain** will write the test scripts for testing, Performance testing is a testing method used to determine the speed of a computer, network or devices. different types of performance tests that can be applied during software testing. This is non-functional testing, which is designed to determine the readiness of a system. (Functional testing focuses on individual functions of software.

■Regression testing

Definition: Regression testing is the selective retesting of a system or a component to verify that the modifications have not caused unintended effects and that system or component still works as specified in the requirements.

■Acceptance Testing

- To confirm the system requirement has been fulfilled and meets the criteria given acceptance testing is performed.
- Different selection of acceptance criteria has been performed such as reliability, usability, security, maintainability for our application.
- Both User Acceptance testing and business acceptances testing is performed.
- Any problem in the application was fixed with the help of the customer.
- Performed by Customers and end users.

Participants: **Pritha, Israt Jahan** will be responsible for User Acceptance Testing and her team member will be in her responsibilities.

Methodology: The final level, Acceptance testing (or User Acceptance Testing), is conducted to determine whether the system is ready for release. During the Software development life cycle, requirements changes can sometimes be misinterpreted in a fashion that does not meet the intended needs of the users. During this final phase, the user will test the system to find out whether the application meets their business' needs. Once this process has been completed and the software has passed, the program will then be delivered to production.

Pritha, Israt Jahan will write the test scripts for testing, what will be the sequence of events for User Acceptance Testing, **Pritha, Israt Jahan** will test when activity take place

6.2 Test Tools

- VS Code(for Writing Codes)
- Python 3.8(for running Testing Commands)
- Selenium(Testing Tool)
- Web Browser(Google Chrome)

■ Testing Process:

- **Login Module:**

After installing all the necessary files we log in to the server to open our project. After getting the IP-link we connected to the software that we asked the automated software to search for "username " and write "Ayon07". If the user name input is done correctly, we will get a message as user name input completed. The same goes to the password. In password field we will insert "123456" then press the button "Login". If password works properly then we will get the answer as succussed or failed.

```

login.py > ...
1  from selenium.webdriver.common.by import By
2  from selenium import webdriver
3  import time
4  from selenium.webdriver.chrome.service import Service
5  from webdriver_manager.chrome import ChromeDriverManager
6  driver = webdriver.Chrome(service=Service(ChromeDriverManager().install()))
7  # driver = webdriver.Chrome(executable_path="chromedriver.exe")
8  driver.get("http://127.0.0.1:8000/login") ← Laravel project hyper-link
9  time.sleep(2)
10 #name = u_username
11 name = driver.find_element(By.ID, "u_username")
12 name.send_keys("Ayon07")
13 time.sleep(2)
14 print("Username input completed")
15 password = driver.find_element(By.ID, "u_password")
16 password.send_keys("123456")
17 print("Password input completed")
18 time.sleep(2)
19 #password = u_password
20 # id = login
21
22 button = driver.find_element(By.ID, "login")
23 button.click()
24 print("Login button clicked")
25
26 if driver.title == "User Dash":
27     print("Successfully Logged In")
28 else:
29     print("Login Failed")
30 time.sleep(2)
31 driver.quit()
32

```

Figure 3: Testing Login Module

```

PS D:\12thsem\sqt\selenium> py login.py

DevTools listening on ws://127.0.0.1:64935/devtools/browser/0b987e6f-3dad-496b-9ece-681878cd312b
[23800:23868:0718/204432.904:ERROR:device_event_log_impl.cc(214)] [20:44:32.903] Bluetooth: bluetooth_adapter_w
inrt.cc:1074 Getting Default Adapter failed.
Username input completed
Password input completed
Login button clicked
Successfully Logged In ← Accessed

```

Figure 4: Result of Login

In Figure 3, we have shown the code of login page testing. And after that when we execute the code at first we can see the login page of our ecommerce site and all the input fields are blank there in Figure 4. Also in Figure 5, we can see the username is automatically inserted. After that it will insert the Password which is in Figure 6. Then the login button will be clicked and it will enter the user dash board and we can see the Name of the user in Figure 7. And in Figure 8, we can see the output of the result either the input was given perfectly or not and the login was successful or not.

■ Result:

As we inserted correct username and password provided by the teams and as it is logged in successfully. So we can say that the code was correctly implemented.

- **Error checking on Login Module:**

As correct password and username leads us to get the access of login to the software it's time to check whether the code can distinguish correct input from the wrong input and whether it grant us the access to log in.

```
PS D:\12thsem\sqt\selenium> py login.py

DevTools listening on ws://127.0.0.1:63657/devtools/browser/4f46e8eb-cdc6-4e50-b300-ff494ad1847a
[14592:25216:0718/203508.636:ERROR:device_event_log_impl.cc(214)] [20:35:08.635] Bluetooth: bluetooth_adapter_winrt.cc:1074 Getting Default Adapter failed.
Username input completed ✓
Password input completed ✓
Login button clicked ✓
Login Failed ← Denied access
```

```

from selenium.webdriver.common.by import By
from selenium import webdriver
import time
from selenium.webdriver.chrome.service import Service
from webdriver_manager.chrome import ChromeDriverManager
driver = webdriver.Chrome(service=Service(ChromeDriverManager().install()))
# driver = webdriver.Chrome(executable_path="chromedriver.exe")
driver.get("http://127.0.0.1:8000/login")
time.sleep(2)
#name = u_username
name = driver.find_element(By.ID, "u_username")
name.send_keys("Ayon07")
time.sleep(2)
print("Username input completed")
password = driver.find_element(By.ID, "u_password")
password.send_keys("1234567")
print("Password input completed")
time.sleep(2)
#password = u_password
# id = login

button = driver.find_element(By.ID, "login")
button.click()
print("Login button clicked")

if driver.title == "User Dash":
    print("Successfully Logged In")
else:
    print("Login Failed")
time.sleep(2)
driver.quit()

```

Correct

Wrong input provided

Message

Figure 9: Error checking of login module

- **Adding User Module:**

In this test case we will creating an user automatically using Selenium. For this we will be providing username, password, phone number, Email and if every given data matched with the validation state the program will let us to create a new user.

```

createuser.py > ...
1  from selenium.webdriver.common.by import By
2  from selenium import webdriver
3  import time
4  from selenium.webdriver.chrome.service import Service
5  from webdriver_manager.chrome import ChromeDriverManager
6  driver = webdriver.Chrome(service=Service(ChromeDriverManager().install()))
7  # driver = webdriver.Chrome(executable_path="chromedriver.exe")
8  driver.get("http://127.0.0.1:8000/admin/create") ← Admin creation link
9  time.sleep(5)
10
11  name = driver.find_element(By.ID, "u_name")
12  name.send_keys("Ananyo Chowdhury") ←
13
14  phone = driver.find_element(By.ID, "u_phone")
15  phone.send_keys("01649889794") ←
16
17  address = driver.find_element(By.ID, "u_address")
18  address.send_keys("Gulshan, Dhaka") ←
19
20  username = driver.find_element(By.ID, "u_username")
21  username.send_keys("Ananyo10") ←
22
23
24  email = driver.find_element(By.ID, "u_email")
25  email.send_keys("Ananyo4@gmail.com") ←
26
27
28  password = driver.find_element(By.ID, "u_password")
29  password.send_keys("123456") ←
30
31  usertype = driver.find_element(By.ID, "Admin")
32  usertype.click()

```

Proving data to the automated software

Figure 10: Creating User testing Module

```

PS D:\12thsem\sqt\selenium> py createuser.py

DevTools listening on ws://127.0.0.1:52565/devtools/browser/c0c8ab46-6867-47bc-94ab-336f9d13b1be
[9664:12484:0718/212156.124:ERROR:device_event_log_impl.cc(214)] [21:21:56.124] Bluetooth: bluetooth_adapter_winrt.cc:1074 Getting Default Adapter
failed.
Signup clicked
Successfully User Added
PS D:\12thsem\sqt\selenium>

```

Figure Output of Creating User Module

Here, On Figure 11, we can see the testing code of creating new user. Then when we execute the code, the chrome file opens the creating user link where the input field is blank and after that in the Figure 11, the input field was filled automatically. And that Figure 14, output of the test file and user was added successfully.

Result: As we inserted correct and validate inputs we can see that the user was added successfully and it printed “Successfully User Added”.

6.3 Meetings

Test team will evaluate and discuss on progress, errors and problem from the 1st week. Test team leader will have their meeting with Development and project manager from every 2nd week. Additional Meetings will be held based on emergency.

	Week 1	Week 2	Week 3	Week 4	Week 5	Week 6
Test team Meeting		X		X		X
Test team leader with Development and Project Manager	X		X		X	
Additional Meeting	Based on Emergency					

7. TEST CASE/TEST ITEMS

7.1 Test case 01:

Project Name: Ecommerce Shopping System			Test Designed by: Ananya Chowdhury	
Test Case ID: ESS_1			Test Designed date: 30/07/2022	
Test Priority (Low, Medium, High): High			Test Executed by: Zahir, Tanzima	
Module Name:User Registration Session			Test Execution date: 09/08/2022	
Test Title: Validate registering an account providing only mandatory field for user.				
Description: Test website registration page.				
Precondition (If any): Open the website.				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1. Go to the Register 2. Click the "Register" 3. Enter a new account detail for the only mandatory field 4.Click on the SIGN-UP button. (ER-1)	Name: Ananyo07 Usertype: Customer Password: 12345	User should be Registered, taken to login page and proper details of login should be displayed on the page.	As expected,	Pass
Post Condition: User information saved into the database				

7.2 Test case 02:

Project Name: Ecommerce Shopping System		Test Designed by: Ananya Chowdhury		
Test Case ID: ESS_2		Test Designed date: 31/07/2022		
Test Priority (Low, Medium, High): High		Test Executed by: Zahir, Tanzima		
Module Name: User Login		Test Execution date: 08/08/2022		
Test Title: Validate the login functionality providing the valid credential.				
Description: Test the user login page				
Precondition (If any): Go to the website and view the login page.				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1. Go to the login page. 2.Enter valid credential 3. Click on the LOGIN button. (ER-1)	Admin ID:Ananyo07 Password: 12345	User can successful login.	As expected,	Pass
Post Condition: User can go to the dashboard page.				

7.3 Test case 03:

Project Name: Ecommerce Shopping System			Test Designed by: Ananya Chowdhury	
Test Case ID: ESS_3			Test Designed date: 31/07/2022	
Test Priority (Low, Medium, High): High			Test Executed by: Ananya Chowdhury	
Module Name: User Login			Test Execution date: 08/08/2022	
Test Title: Validate the login page without providing any credentials.				
Description: Test the user login page				
Precondition (If any): Go to the website and view the login page.				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1. Go to the login page. 2.Enter valid credential 3. Click on the LOGIN button. (ER-1)	Not Applicable	Show invalid account	As expected,	failed
Post Condition: Same as precondition.				

7.4 Test case 04:

Project Name: Ecommerce Shopping System			Test Designed by: Ananya Chowdhury	
Test Case ID: ESS_4			Test Designed date: 31/07/2022	
Test Priority (Low, Medium, High): High			Test Executed by: Ananya Chowdhury	
Module Name: Admin Login			Test Execution date: 08/08/2022	
Test Title: Validate the login functionality providing the valid credential.				
Description: Test the Admin login page				
Precondition (If any): Go to the website and view the login page.				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1. Go to the admin login page. 2.Enter valid credential 3. Click on the LOGIN button. (ER-1)	Admin ID: Admin Password: 123	Admin can successful login.	As expected,	Pass
Post Condition: Admin can go to the dashboard page.				

7.5 Test case 05:

Project Name: Ecommerce Shopping System			Test Designed by: Ananya Chowdhury	
Test Case ID: ESS_5			Test Designed date: 31/07/2022	
Test Priority (Low, Medium, High): High			Test Executed by: Ananya Chowdhury	
Module Name: View and update the User List			Test Execution date: 08/08/2022	
Test Title: Usertype Define and viewing of user profiles				
Description: Admin should view & update the profile of the users if needed				
Precondition (If any): Admin has the access to update the profiles				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
5. Go to the website 6. Edit a profile 7. Click submit 8. View profile	Username: Rifat05 Password: 54321 Profile Picture: 3.jpg	Admin can successfully update and view the profile of user.	As expected,	Pass
Post Condition: Admin can update the user profile information and can see them accordingly.				

7.6 Test case 06:

Project Name: ecommerce shopping system			Test Designed by: ashraf hossain	
Test Case ID: ESS_06			Test Designed date: 12-08-22	
Test Priority (Low, Medium, High): medium			Test Executed by: annanyo	
Module Name: Delivery Status Change			Test Execution date: 19-08-2022	
Test Title: delivery status				
Description: If package is moved from one hand to another or from on station to another status will change				
Precondition (If any): 1. User need order an item from the store				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1. Click order details 2. Click:Product tracking number status change 3. Drop down manu 4. Radio button appear 5. Click from packed to deliverd	Selected : delived	Status changed	As expected,	Pass
Post Condition: User can see product as delived from packed				

7.7 Test case 07:

Project Name: ecommerce shopping system			Test Designed by: Ashraf Hossain	
Test Case ID: ESS_07			Test Designed date: 13-08-22	
Test Priority (Low, Medium, High): medium			Test Executed by: Pritha, Israt Jahan	
Module Name: Add Product			Test Execution date: 20-08-2022	
Test Title: vendor product add				
Description: if a vendor want to add a product in there customer ,can add that product in there store				
Precondition (If any): vendor need to be signed in to his designated stored				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1. Login to vendors account 2. Click products 3. Click:Add new products 4. Click :add	1. product name: xyz 2. product price:***	New product added	As expected,	Pass
Post Condition: product name has to be leagal to sell				

7.8 Test case 08:

Project Name: ecommerce shopping system			Test Designed by: Ashraf Hossain	
Test Case ID: ESS_08			Test Designed date: 15-08-22	
Test Priority (Low, Medium, High): medium			Test Executed by: Ananya Chowdhury	
Module Name: See Order List			Test Execution date: 31-08-2022	
Test Title: order list visibleness				
Description: if any user order goods all his/her products can be veasible				
Precondition (If any): User need order an item from the store				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1.login to user account 2. order any products 3.Click order details 4. Click:order list	No data needed	Can see product ordered	As expected,	Pass
Post Condition: User can see product				

7.9 Test case 09:

Project Name: ecommerce shopping system			Test Designed by: Ashraf Hossain	
Test Case ID: ESS_08			Test Designed date: 15-08-22	
Test Priority (Low, Medium, High): medium			Test Executed by: Pritha, Israt Jahan	
Module Name: See Category List			Test Execution date: 31-08-2022	
Test Title: user can see product as category				
Description:as there are many products user can see products listed as category				
Precondition (If any):				
Test Steps	Test Data	Expected Results	Actual Results	Status (Pass/Fail)
1.login to user account 3.Click products 4. Click:view as category	Login id:xyz Pass: ***	Can see product as category	As expected,	Pass
Post Condition: User can order from the category view				

8. ITEM PASS/FAIL CRITERIA

Once the first group of distributors has successfully turned in reallocated sales data for a month and the new health data balances with the old health registration data received in parallel. The test procedure will be finished. If the project's testing team reports that 30% of the test cases have failed, the project will be halted until the problem is resolved. In certain cases, testing will continue until the development team has corrected all of the failed instances, which might take many weeks in some circumstances.

When the sales administration team is satisfied that the data is valid, the first set of distributors will be activated, and all parallel processing for those accounts will be disabled.

9. TEST DELIVERABLES

- Software test strategy and plan
- Acceptance test plan
- System/Integration test plan
- Test case
- Test Documentation
- Daily Test Status Report
- Report mock-ups
- Defect/Incident reports and summaries
- Test logs and turnover reports
- Report mock-ups
- Test Project Closure report

10. STAFFING AND TRAINING NEEDS

There will be a lead developer, an eight-person development team, and a project manager, one marketing/Sales person. It is preferred that there will be at least one full time tester. There will be one Test manager for leading the testing team. The project's unit, system, and integration

testing phases will be assigned to full-time testers. If separate tester is not available for the project, it is important that project manager or test manager will fill the role.

The testers will participate in the code review process after training for at least one month to the project. After that they will be assigned full time. Developers need proper understanding of the program and junior developers have to go through training if needed in the early phase. The tester must have training on the basic operation of the testing interface. Marketing administration staff will need to have idea on the project and software as well.

10.1 Environment Requirements:

Here, we have used windows 8/10 operating system for building our project. Also there are some key areas to set up an environment which are given below:

- Database Server
- Font-end running Environment
- Client Operating System
- Browser
- Hardware includes Server Operating System
- Network

Every test may not be executed on a local machine. It may need establishing a test server, which can support applications. Network set up such as internet, LAN Wifi, private network setup. Also there must be Visual Studio installation and Laravel Composer and XAMPP for running the Project.

Also, these environment must be well maintained and some of the activities are given below:

- Ongoing maintenance of a central repository containing all updated versions of test environments.
- Management of the test environment in accordance with the needs of the test team.
- Creating new environments in accordance with the new requirements
- Environmental surveillance
- Updating/removing obsolete test environments
- Environmental issues are being investigated.
- Coordination until the issue is resolved.

11. RESPONSIBILITIES

	Project Manager	Test Manager	Test Team	Development	Customer
Test Procedure	X	X	X	X	
Design Review	X	X	X	X	X
Code Review	X			X	
Unit test documentation and execution		X	X	X	
System/Integration Testing documentation and execution		X	X	X	
Acceptance Testing documentation and execution	X	X	X		X
Regression Testing	X	X	X	X	

12. TESTING SCHEDULE

Task Name	Duration	Responsible
Documentation	4 days	Test Lead
Design	5 days	Software Tester
Test Plan	9 days	Test Engineer
Unit Testing	9 days	Software Tester
Integration Testing	6 days	Software Tester
System Testing	1 week	Software Tester
Performance and stress testing	1week	Software Tester
Regression testing	2weeks	Software Tester
Acceptance Testing	7 days	Software Tester
Project Completion	6 days	Test Engineer
Feedback	4 days	Test Lead

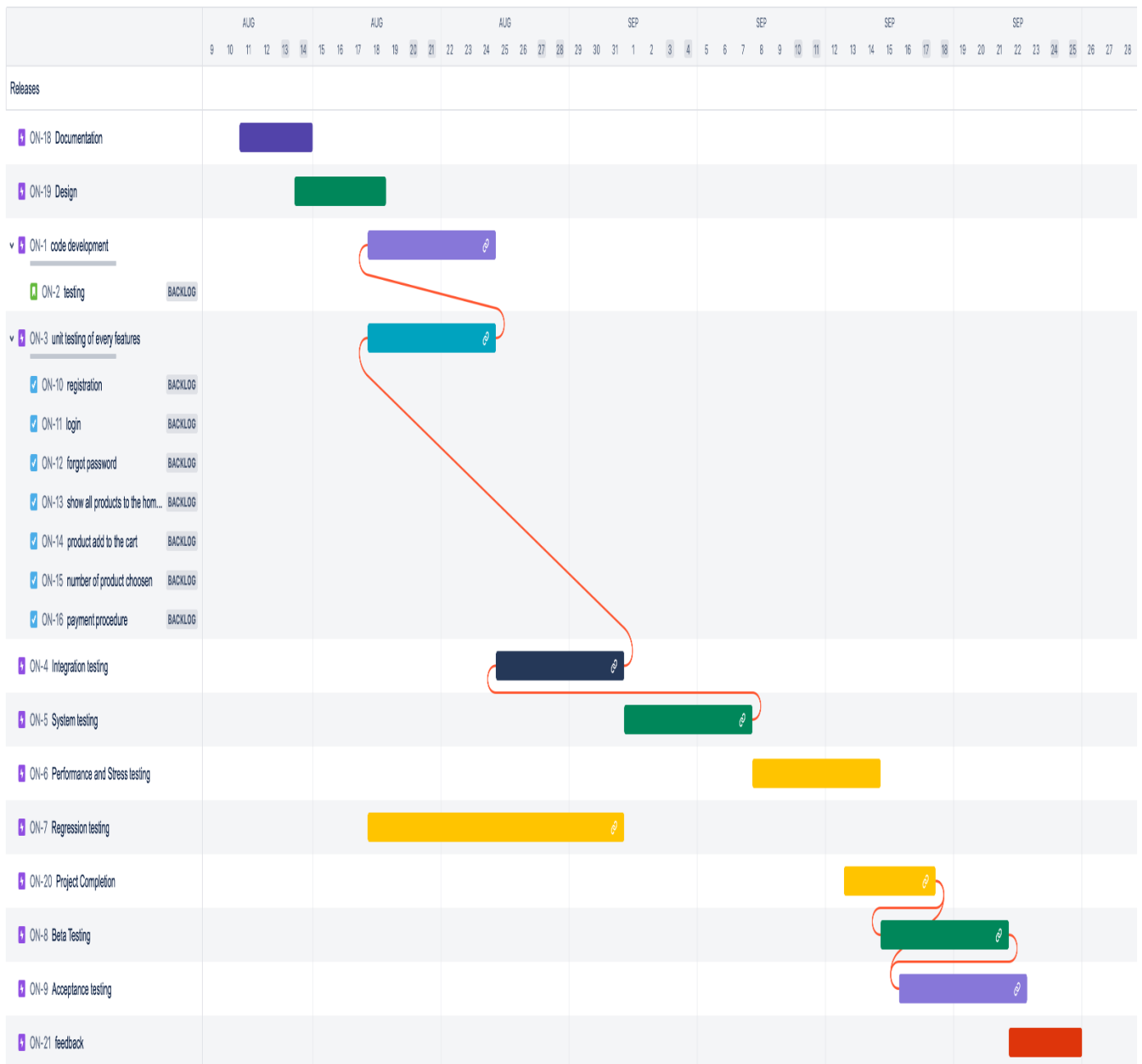


Fig 5: Project time scheduling

Incident Testing Report:

Incident	Test Case	Inputs	Expected Results	Anomalous Results	Observations
ESS_1	User Registration Session	Name: Ananyo07 Ustertype: Customer Password: 12345	User should be Registered, taken to login page and proper details of login should be displayed on the page.	As expected	pass
ESS_2	User Login	Admin ID:Ananyo07 Password: 12345	User can successful login	As expected	pass
ESS_3	User Login with invalid inputs	Not Applicable	Show invalid account	As expected	failed
ESS_4	Admin Login	Admin ID: Admin Password: 123	Admin can successful login.	As expected	pass
ESS_5	View and update the User List	Username: Rifat05 Password: 54321 Profile Picture: 3.jpg	Admin can successfully update and view the profile of user.	As expected	pass
ESS_6	Delivery Status Change	Selected : delived	Status changed	As expected	pass
ESS_7	vendor product add	1. product name: xyz 2. product price:***	New product added	As expected	pass
ESS_8	order list visiblenss	No data needed	Can see product ordered	As expected,	Pass
ESS_9	See Category List	Login id:xyz Pass: ***	Can see product as category	As expected,	Pass

13. PLANNING RISKS AND CONTINGENCIES

There may be some potential risks with a chance of happening that could result in development losses.

- Lack of personnel resources when testing is to begin.
- Delays in training on the application and/or tools.
- Late delivery of the hardware or tools.
- Coming change request frequently.
- Lack of availability of required hardware, software, data or tools.
- Project schedule get slip when project tasks and schedule release risks are not addressed properly.

There are some specific tasks that must be completed at certain times throughout various events. If these modifications are made, the following steps will be taken:

- The number of tests performed will be reduced to a certain amount.
- The development and test schedules will be extended by the necessary number of days. This rarely occurs, as most projects tend to have fixed delivery dates.
- The scope of the plan may be changed.
- The test team will work overtime.

14. APROVALS

Project Sponsor	Rifat, MD. Ashraf Hossain
Development Management	Zahir, Tanzima
Project Manager	Chowdhury, Ananya
Test Manager	Zahir, Tanzima
Development Team Manager	Chowdhury, Ananya
Reassigned Sales	Pritha, Israt Jahan
Order Entry EDI Team Manager	Rifat, MD. Ashraf Hossain